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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/227,770	01/08/1999	SURESH NARAYANA CHARI	YO999-002	7725

7590 01/13/2005

IBM CORPORATION
INTELLECTUAL PROPERTY LAW DEPT
P O BOX 218
YORKTOWN HEIGHTS, NY 10598

EXAMINER

JACKSON, JENISE E

ART UNIT	PAPER NUMBER
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2131

DATE MAILED: 01/13/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

09/227,770

Applicant(s)

CHARI ET AL.

Examiner

Jenise E Jackson

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE _____ MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☐ Responsive to communication(s) filed on _____.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1,5-7,9-13,17-26,30,31,35-40,44 and 49-59 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☒ Claim(s) 7 and 9-13 is/are allowed.
- 6) ☒ Claim(s) 1,5,6,17-24,26,30,31,35,36,38,39,44,49-56 and 58 is/are rejected.
- 7) ☒ Claim(s) 25, 57 is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
 - ☐ Certified copies of the priority documents have been received in Application No. _____.
 - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

Claim Rejections - 35 USC § 102

1. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

2. Claims 1, 5-6, 17-24, 26, 30-31, 35-36, 38-39, 44, 49-56, 58 rejected under 35

U.S.C. 102(e) as being anticipated by Cashman(6,209,087).

3. As per claims 1, 17-18, 26, 35-36, 38, 39, 44, 49-50 Cashman discloses providing a secure communications between a client(108) and a server(107)(see fig. 1, sheet 1) employing an untrusted proxy(i.e. network device)(see col. 7, lines 48-65), embedding a secure coprocessor(100) for use as an agent of the client(108), and server(107)(see fig. 1, sheet 1, see col. 7, lines 48-65), the proxy receiving a specific communication request from the client(see col. 7, lines 66-67, col. 8, lines 1-4), employing a proxy(i.e. network device)(104) between the client and the server to provide connection links between the client and server(see fig. 1, sheet 1), the coprocessor(100) acting as converter between at least one protocol the client(108) supports and at least one other protocol supported by the server(107), the Examiner asserts that Cashman discloses this because Cashman discloses that the coprocessor(100) can implement protocols on data in both the sending and receiving directions(see col. 8, lines 29-32), and employing respective security protocols of the at least one protocol and the at least one other protocol; the Examiner asserts that security protocol is broadly interpreted to be any protocol that is security

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related. Therefore, Cashman discloses employing respective security protocols of the at least one protocol and the at least one other protocol, because Cashman discloses that the coprocessor(100) performs protocols such as encryption and decryption(see col. 8, lines 19-20, col. 13, lines 27-29). Further, Cashman discloses splicing a plurality of secure communication protocols of different protocol suites into the agent, because Cashman discloses that the coprocessor can be programmed for multiple protocols(see col. 3, lines 44-48, col. 4, lines 39-50), and guarantees that an application(inherent), embedded in the coprocessor performs to a degree of security proscribed by the client and/or server(see col. 8, lines 6-26). Cashman discloses the proxy cannot tamper with the functioning of the agent the agent being a software program or hardware logic operating within the confines of the coprocessor(see col. 8, lines 24-26), because Cashman discloses that the coprocessor handles and performs protocols, and Cashman does not disclose the proxy handling the coprocessor's job, thus the proxy does not tamper with the functioning of the agent. Further, Cashman discloses the proxy forming an n-tuple(i.e. packets) for a specific communication(see col. 7, lines 55-58), proxy forwarding the n-tuple(i.e. packet) to the coprocessor(100)(see col. 7, lines 66-67, col. 8, lines 1-8), coprocessor generating a response including a directive to the n-tuple; the coprocessor sending the response to the proxy and the proxy implementing a directive(see col. 7, lines 66-67, col. 8, lines 1-18).

4. As per claim 5, Cashman discloses wherein the client is a pervasive computing device(see col. 7, lines 48-65).

5. As per claim 6, Cashman et al. discloses the step of adapting content supplied by the client to fit constraints of the server and/or the connection links(see col. 8, lines 1-18).

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6. As per claim 19, Cashman discloses wherein the step of receiving includes, awaiting a connection request from a client; creating an entry in a storage module for the client; determining a sender of each received packet; and retrieving a stored entry(see col. 8, lines 1-32).
7. As per claim 20, Cashman discloses wherein the n-tuple includes a sender id, an entry from a storage module and the received packet(see col. 8, lines 1-32).
8. As per claim 21, Cashman discloses wherein the client and the server can be either a sender or a receiver, and the step of generating includes employing a first protocol from the sender to the proxy and a second protocol from the proxy to the receiver and translating between the first and second protocols(see col. 8, lines 1-52).
9. As per claim 22, Cashman discloses wherein the translating includes decrypting the received packets as specified by the security parameters negotiated as per the first protocol and encrypting the decrypted packet as specified by the security parameters of the second protocol(see col. 8, lines 19-52).
10. As per claim 23, Cashman discloses wherein the translating includes modifying the received packet to meet constraints of the receiver and wherein the directive includes forwarding to the receiver the packet resulting from the step of modifying(see col. 8, lines 19-52).
11. As per claim 24, Cashman discloses aggregating a plurality of packets into a group of packets and performing content adaptation on the group of packets(see col. 8, lines 1-32).
12. As per claims 30-31 rejected under the same basis as claim 6.
13. As per claim 51, it is rejected under the same basis as claim 19.
14. As per claim 52, it is rejected under the same basis as claim 20.
15. As per claim 53, it is rejected under the same basis as claim 21.

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16. As per claim 54, it is rejected under the same basis as claim 22.
17. As per claim 55, it is rejected under the same basis as claim 23.
18. As per claims 56, 58, it is rejected under the same basis as claim 24.
19. As per claims 7, 9-13, 40, 59 are allowable for the features of splicing a plurality of secure communication protocols of different protocol suites into the agent, wherein the step of splicing a plurality of secure communication protocols is a security protocol of a Wireless Application Protocol Suite(WAP) to that of an Internet Protocol(IP) device. The reason why these claims are allowable because prior art fails to show an agent of the coprocessor that splices these particular protocols. The closest prior art that shows an agent of the coprocessor that splices protocols is Cashman; although Cashman does not disclose these specific protocols. As per claims 25, 57, it is objected to as being rejected on base claim 17. The same reason applies as above.

Response To Amendment

20. The Applicant states that Cashman does not disclose that the proxy cannot tamper with the function of the coprocessor. The Examiner disagrees. Cashman discloses that the coprocessor is responsible for encrypting the packets, not the network device, the network device does not tamper with the coprocessor(see col. 8, lines 1-18). Second, the Applicant merely states that Cashman does not disclose certain limitations, without specifically pointing out within the reference where this limitation is not disclosed. Applicant's arguments fail to comply with 37 CFR 1.111(b) because they amount to a general allegation that the claims define a patentable

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invention without specifically pointing out how the language of the claims patentably distinguishes them from the references.

21. The Applicant states that Cashman describes a method, which uses a coprocessor to implement elements of the protocol translation process between client and server. Further, the Applicant states the coprocessor in their invention to enforce the trust model between the client and server. Further, the Applicant states that there is no end-to-end security. The Examiner disagrees (see pg. 2, previous rejection). Cashman discloses end-to-end security, because Cashman discloses encrypting and decrypting packets(see col. 8).

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Jenise E Jackson whose telephone number is (571) 272-3791. The examiner can normally be reached on M-Th (6:00 a.m. - 3:30 p.m.) alternate Friday's.

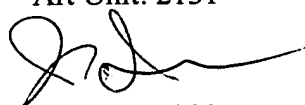
If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Ayaz Sheikh can be reached on (571) 272-3795. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

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A handwritten signature in black ink, appearing to be 'J. D.', written in a cursive style.

January 7, 2005

E. Moise
EMMANUELL MOISE
PATENT EXAMINER